

- 1       1. A method of managing workflows in a service provider environment in which a  
2 service provider provides data storage resources to a customer, comprising:  
3           providing a customer with a list of types of work order requests based on a  
4 permission level associated with the customer, the work order requests comprising requests  
5 to manage storage configuration;  
6           receiving a selection of a type of work order request from the customer;  
7           enabling the customer to generate a work order request of the selected type in a work  
8 order request submission;  
9           creating a database object based on the work order request; and  
10          storing the database object in a database.
- 1       2. The method of claim 1, wherein enabling comprises:  
2           providing to the customer at least one task screen corresponding to the selected type  
3 of work order request and usable by the customer to generate the work order request.
- 1       3. The method of claim 1, wherein the work order request comprises values of  
2 parameters specific to the selected type of work order request.
- 1       4. The method of claim 1, wherein the database object comprises elements that include a  
2 customer identifier and the selected type of work order request.
- 1       5. The method of claim 4, wherein the elements further include a state to indicate status  
2 of the work order request.
- 1       6. The method of claim 5, wherein state can be set to indicate a new work order request  
2 initially and later changed to indicate a closed work order request.

- 1       7. The method of claim 5, further comprising:  
2              assigning a work order request identifier to the work order request; and  
3              providing the assigned work order request to the customer.
- 1       8. The method of claim 7, wherein the database object is stored in the database as a table  
2 entry, the table entry including fields to store information associated with each of the  
3 elements.
- 1       9. The method of claim 8, wherein the elements further comprise the assigned work  
2 order request identifier and the work order request is stored in one of the fields in the table  
3 entry.
- 1       10. The method of claim 5, further comprising:  
2              processing the work order request using the table entry, processing comprising  
3 attempting to perform any tasks required to satisfy the work order request; and  
4              updating the state based on the results of the processing.
- 1       11. The method of claim 10, wherein updating comprises:  
2              marking the state to indicate that the work order request is closed if such tasks are  
3 performed successfully; and  
4              otherwise, marking the state to indicate a failure.
- 1       12. The method of claim 10, further comprising:  
2              generating a billable event when the work order request is closed; and  
3              storing the billable event in the database in association with the customer identifier  
4 and account information.
- 1       13. The method of claim 1, wherein work order request submission is in the form of an  
2 email.

1       14.     The method of claim 1, wherein work order request submission is in the form of  
2           HTTP.

1       15.     The method of claim 10, wherein processing is managed by a workflow automation  
2           that periodically queries the database to locate any new work order requests based on the  
3           state in the table entry for each work order request.

1       16.     The method of claim 12, wherein the processing, updating, and the generating and  
2           storing of the billable event are handled by the workflow automation

1       17.     The method of claim 15, wherein the workflow automation invokes other processes  
2           needed to perform the work order request.

1       18.     The method of claim 10, wherein processing is managed manually by an  
2           administrator of the service provider.

1       19.     The method of claim 12, wherein the processing, updating, and the generating and  
2           storing of the billable event are handled manually by the service provider administrator.

1       20.     The method of claim 12, wherein the processing, updating, and the generating and  
2           storing of billable events are managed manually by the service provider administrator when  
3           the state indicates a failure.

1       21.     A computer program product residing on a computer-readable medium for managing  
2           workflows in a service provider environment in which a service provider provides data  
3           storage resources to a customer, the computer program product comprising instructions  
4           causing a computer to:

5              provide a customer with a list of types of work order requests based on a permission  
6           level associated with the customer, the work order requests comprising requests to manage  
7           storage configuration;

8              receive a selection of a type of work order request from the customer;

9           enable the customer to generate a work order request of the selected type in a work  
10          order request submission;  
11          create a database object based on the work order request; and  
12          store the database object in a database.

1       22. An apparatus for managing workflows in a service provider environment in which a  
2          service provider provides data storage resources to a customer, comprising:  
3           means for providing a customer with a list of types of work order requests based on a  
4          permission level associated with the customer, the work order requests comprising requests  
5          to manage storage configuration;  
6           means for receiving a selection of a type of work order request from the customer;  
7           means for enabling the customer to generate a work order request of the selected type  
8          in a work order request submission;  
9           means for creating a database object based on the work order request; and  
10          means for storing the database object in a database.

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